

AMENDMENTS TO THE CLAIMS

Claim 1 (currently amended): An OSD control method comprising:
storing frame data, which corresponds to a frame of a display screen without OSD data,
in a display buffer with plural registers;
storing the OSD data, which corresponds to an OSD window included in the frame, in a
memory; ~~and~~
determining whether an OSD function is enabled; and
copying the OSD data and storing the OSD data to the registers corresponding to the
OSD window by a data processing method in response to the determination that OSD function is
enabled.

Claim 2 (currently amended): The OSD control method as claimed in claim 1, wherein
the data processing method is a bit block transfer.

Claim 3 (currently amended): The OSD control method as claimed in claim 1, wherein
the data processing method is a video overlay.

Claim 4 (currently amended): The OSD control method as claimed in claim 1, wherein
the step of storing the OSD data to the registers comprises:

setting up a bit block transfer flag; and
storing the OSD data to the register of the display buffer corresponding to the OSD
window by a bit block transfer.

Claim 5 (currently amended): The OSD control method as claimed in claim 4, ~~wherein,~~
further comprising the steps of:

recovering the data in the register of the display buffer which corresponds to the OSD
window; and
clearing the bit block transfer flag.

Claim 6 (original): The OSD control method as claimed in claim 1, wherein, the steps of copying the OSD data in the register comprises:

- setting up a video overlay flag;
- setting up a video overlay window;
- setting up a video overlay register; and
- enabling a video overlay function displaying the OSD window.

Claim 7 (original): The OSD control method as claimed in claim 6, wherein, further comprising the steps of:

- disabling the video overlay function; and
- clearing the video overlay flag.

Claim 8 (previously presented): The OSD control method as claimed in claim 1, wherein the display buffer stores the frame data and the OSD data after storing the OSD data to the registers corresponding to the OSD window.

Claim 9 (currently amended): The OSD control method as claimed in claim 1, further comprising a ~~the~~ step of outputting the data comprising the frame data and the OSD data stored in the display buffer to a display device.

Claim 10 (currently amended): The OSD control method as claimed in claim 8, further comprising a ~~the~~ step of outputting the data comprising the frame data and the OSD data stored in the display buffer to a display device.

Claim 11 (currently amended): The OSD control method as claimed in claim 8, further comprising a ~~the~~ step of storing another OSD data after storing the OSD data to the registers.

Claim 12 (currently amended): The OSD control method as claimed in claim 1, wherein the ~~OSD data processing comprises a step of replaces-replacing~~ the frame data stored in the registers which corresponding to the OSD window with the OSD data.

Claim 13 (new): The OSD control method as claimed in claim 1, further comprising a step of determining whether the OSD data stored in the memory is changed before the step of copying the OSD data.

Claim 14 (new): The OSD control method as claimed in claim 3, further comprising a step of determining whether the video overlay is enabled.

Claim 15 (new): An OSD processing device comprising:
an interface card comprising a display buffer with plural registers for storing frame data, wherein the frame data corresponds to a frame of a display screen without OSD data;
a display device comprising an OSD memory for storing the OSD data corresponding to an OSD window to be displayed in the frame, and displaying data processed by a data processing method; and
a controller copying the OSD data, replacing the frame data stored in the registers of the display buffer corresponding to the OSD window with the OSD data by the data processing method, and outputting the processed data comprising a portion of the frame data and the OSD data stored in the display buffer to the display device.

Claim 16 (new): The OSD processing device as claimed in claim 15, wherein the controller further determines whether an OSD function is enabled, and replacing the frame data stored in the registers of the display buffer corresponding to the OSD window with the OSD data by the data processing method in response to the OSD function is enabled.

Claim 17 (new): The OSD processing device as claimed in claim 15, wherein the data processing method is a bit block transfer.

Claim 18 (new): The OSD processing device as claimed in claim 15, wherein the data processing method is a video overlay.

Claim 19 (new): The OSD processing device as claimed in claim 18, wherein the controller further determines whether the video overlay is enabled.

Claim 20 (new): The OSD processing device as claimed in claim 19, wherein the steps of replacing the frame data using the OSD data comprises:

setting up a bit block transfer flag; and

storing the OSD data to the register of the display buffer corresponding to the OSD window by a bit block transfer.

Claim 21 (new): The OSD processing device as claimed in claim 19, wherein the controller recovers the data in the register of the display buffer which corresponds to the OSD window, and clears the bit block transfer flag in response to a determination that the OSD function is not enabled.

Claim 22 (new): The OSD processing device as claimed in claim 15, wherein the controller replaces the frame data using the OSD data by setting up a video overlay flag, setting up a video overlay window, setting up a video overlay register; and enabling a video overlay function displaying the OSD window in response to the video overlay is not enabled.

Claim 23 (new): The OSD processing device as claimed in claim 20, wherein the controller disables the video overlay function, and clearing the video overlay flag.

Claim 24 (new): The OSD processing device as claimed in claim 15, wherein the display buffer stores the frame data and the OSD data after storing the OSD data to the registers corresponding to the OSD window.

Claim 25 (new): The OSD processing device as claimed in claim 24, wherein the an interface card outputs the data comprising the frame data and the OSD data stored in the display buffer to the display device.